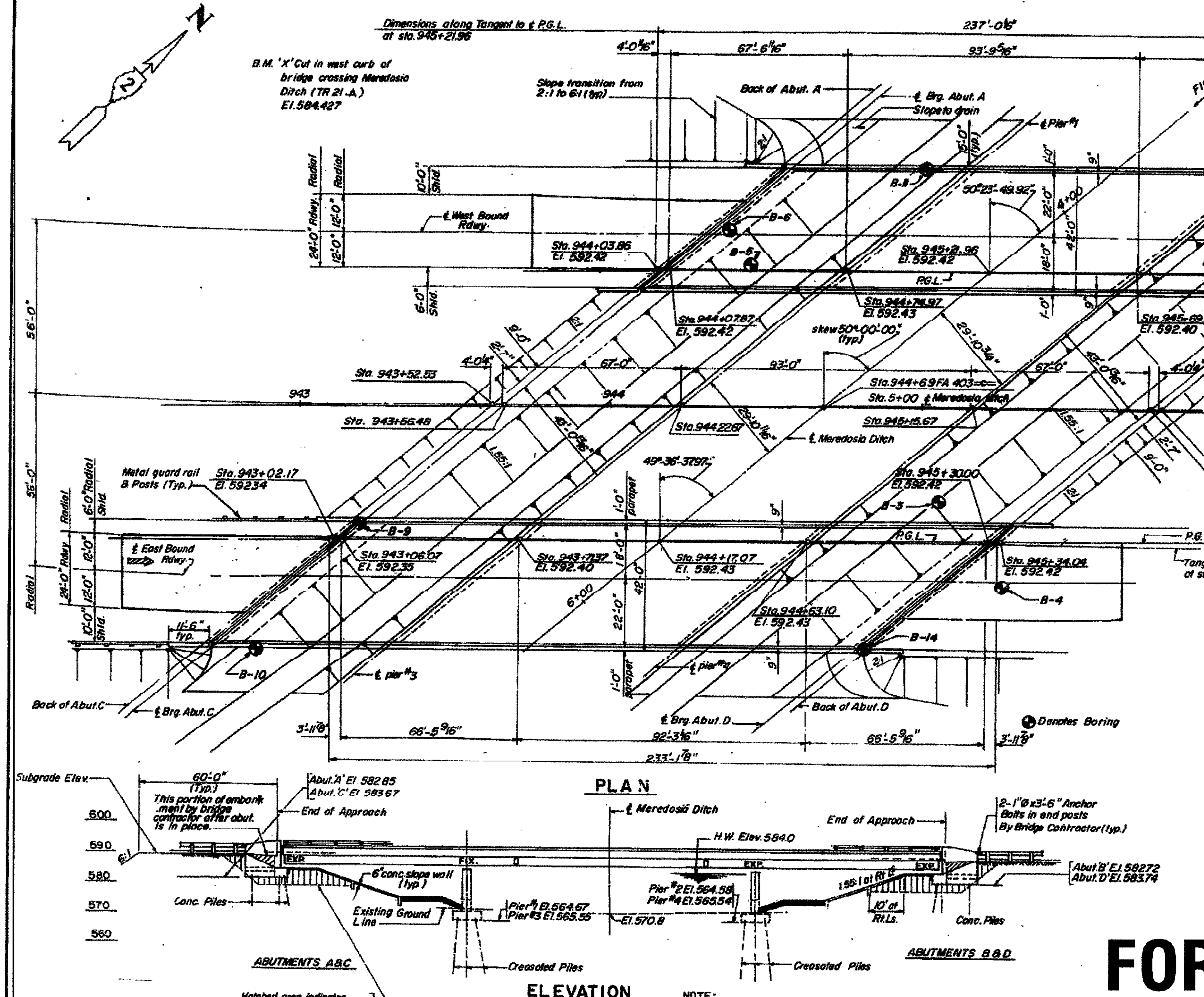
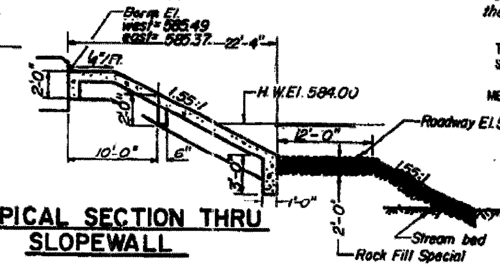
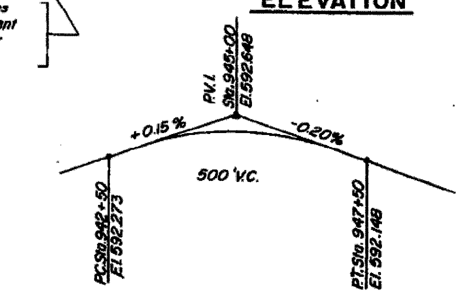
[redacted]





TYPICAL SECTION THRU SLOPEWALL



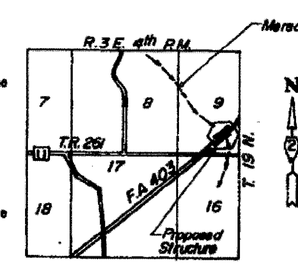
PROFILE FA 403 ALONG ℄ SURVEY
(Top of Class I)

NOTE:

A removal and replacement scheme from 10' behind the abutments to the outer quarter point of the end slopes and between the outer quarter points of the side slopes and to the depths indicated below should be adopted:

a. At abutment A to elevation ± 566.3
b. At abutment B to elevation ± 570.5
c. At abutment C to elevation ± 571.8
d. At abutment D to elevation ± 574.3

Backfill should be with a porous granular material to 2' above the water level in the excavation at the time of replacement. Replacement above this level should be with suitable earth embankment materials.



LOCATION MAP

CURVE DATA FA 403

P.I. Sta. 944+82.56
Δ = 15°-28'-08"
D = 0°-45'
T = 1037.57
L = 2062.52
R = 7639.44
S.E. = 0.032'/Ft.
E = 70.14

WATERWAY DATA

Drainage Area	36.55 Sq. Mi.
Character	Flat Cultivated Land
Required Opening	765 Sq. Ft.
Bottom of Channel	El. 570.8
Design Discharge	3514 cfs.

NOTES:

DESIGN [illegible]:
HS 20-44 [illegible]

DESIGN STRESSES:
[illegible]
fc = 1000 P.S.I. For Conc. In Contact With Earth
fs = 20,000 P.S.I. - Structural Steel
fs = 20,000 P.S.I. Reinforcement Steel
v = 75 P.S.I. Allowable Shear In Footings.
n = 10
Allowable Live Load Deflection = L/1200 (Composite)
DESIGN SPECIFICATIONS: AASHO 1973 As Applicable.

GENERAL NOTES

ALL REINFORCEMENT BARS SHALL BE LAPPED 24 DIAMETERS UNLESS OTHERWISE SHOWN.

FIELD CONNECTIONS SHALL BE BOLTED USING HIGH STRENGTH BOLTS. BOLTS 3/4" Φ, OPEN HOLES 13/16" Φ, UNLESS OTHERWISE NOTED.

THE BASIC LEAD SILICO CHROMATE PAINT SYSTEM SHALL BE USED FOR SHOP AND FIELD PAINTING OF STRUCTURAL STEEL.

FIELD WELDING OF CONSTRUCTION ACCESSORIES WILL NOT BE PERMITTED TO THE BOTTOM OF FLANGE OF BEAMS OR GIRDERS NOR TO THE TOP FLANGE FOR A DISTANCE EQUAL TO ONE-FOURTH THE SPAN LENGTH EACH WAY FROM THE PIER SUPPORTS. FIELD WELDING IN OTHER AREAS WILL BE PERMITTED ONLY WHEN APPROVED BY THE ENGINEER.

ANCHOR BOLTS SHALL BE SET BEFORE BOLTING DIAPHRAGMS OVER SUPPORTS.

SLOPE WALL SHALL BE REINFORCED WITH WELDED WIRE FABRIC 6" x 6" MESH, WEIGHING 58# PER 100 SQ. FT..

THE EMBANKMENT CONFIGURATION SHOWN SHALL BE THE MINIMUM EMBANKMENT THAT MUST BE CONSTRUCTED PRIOR TO CONSTRUCTION OF THE ABUTMENTS.

THE CONTRACTOR SHALL DRIVE FOUR TIMBER TEST PILES, ONE AT EACH PIER AND FOUR CONCRETE TEST PILES, ONE AT EACH ABUTMENT, IN A PERMANENT LOCATION, AS DIRECTED BY THE ENGINEER BEFORE ORDERING THE REMAINDER OF THE PILES.

The main load carrying member components subject to the Supplemental Requirements for Notch Toughness are the flanges, webs, and splice plates of the steel girders or wide flange beams.

THE CONCRETE RAIL SECTION ABOVE THE MANDATORY CONST. JOINT AT THE TOP OF THE SLAB SHALL BE CONSTRUCTED OF CLASS X CONCRETE, EXCEPT THE AGGREGATES SHALL CONFORM TO THE REQUIREMENTS OF HANDRAIL CONCRETE.

PROTECTIVE COAT SHALL NOT BE APPLIED TO SURFACES TO WHICH WATERPROOFING MEMBRANE SYSTEM IS APPLIED.

TOTAL BILL OF MATERIAL

ITEM	UNIT	SUPER STRUCT.	SUB STRUCT.	TOTAL
STRUCTURE EXCAVATION	CU. YDS.	--	625	625
PROTECTIVE COAT	SQ. YDS.	445	--	445
CLASS "X" CONCRETE	CU. YDS.	591.0	1,044.8	1,635.8
STRUCTURAL STEEL	L. SUM	[illegible]	--	[illegible]
ALUMINUM RAILING	LIN. FT.	920	--	920
REINFORCEMENT BARS	LBS.	[illegible]	[illegible]	222,300
STUD SHEAR CONNECTORS	EACH	6,390	--	6,390
CREOSOTED PILES (20.1' TO 38')	LIN. FT.	--	2,920	2,920
CONCRETE PILES	LIN. FT.	--	2,746	2,746
TEST PILES (CONCRETE)	EACH	--	4	4
TEST PILES (TIMBER)	EACH	--	4	4
SLOPE WALL (6")	SQ. YDS.	1,573	--	1,573
BIT. CONC. SURFACE COURSE CLASS I	TONS	166	--	166
WATERPROOFING MEMBRANE SYSTEM	SQ. YDS.	1,867	--	1,867
NEOPRENE EXP. JOINT 2"	LIN. FT.	124	--	124
NEOPRENE EXP. JOINT 2½"	LIN. FT.	130	--	130
REMOVAL & REPLACEMENT OF GRANULAR MAT'LS.	CU. YDS.	--	3,900	3,900
METAL SHOES	EACH	--	212	212
CREOSOTED PILES (UP TO 20')	LIN. FT.	--	846	846
PERMANENT B.M. TYPE I	EACH	1	--	1
NAME PLATES	EACH	1	--	1
ROCK FILL SPECIAL	TON		2,364	2,364

* CALCULATED PLAN WEIGHT OF STRUCTURAL STEEL = 628,240 LBS.

FOR INFORMATION ONLY

LOCATION 4 Structure Numbers 081-0134 & 0135

STA. [illegible] 944+69.
BUILT 19 BY
STATE OF ILLINOIS
[illegible] SEC. [illegible]
FA PROJ. EBRF-403-1(6)
LOADING HS 20

NAME PLATE
SEE STD 2113

APPROVED
FOR STRUCTURES
Engineer of Bridges

GENERAL PLAN & ELEVATION
FA 403 SECTION 161-1B-4
FA 403 OVER MEREDOSIA DITCH
ROCK ISLAND & WHITE SIDE COUNTY
STATION 944+69.00

DESIGNED	H.S.
CHECKED	D.M.P.
DRAWN	A.M.
CHECKED	D.M.P.

* FAI ROUTES 74 & 88
** D2 BRIDGE PAINTING 2008-1

FILE NAME = P:\PAINTING\64D89\paint2008-1.dgn	USER NAME = linkdj	DESIGNED -	REVISED -
		DRAWN -	REVISED -
	PLOT SCALE = 50.0000 '/ IN.	CHECKED -	REVISED -
	PLOT DATE = Tue Jan 29 14:36:34 2008	DATE -	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EXISTING BRIDGE PLANS

SCALE: | SHEET NO. OF SHEETS | STA. TO STA.

F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
*	**	ROCK ISLAND	40	33

CONTRACT NO. 64D89

FED. ROAD DIST. NO. | ILLINOIS | FED. AID PROJECT